ABSTRACT OF DISCLOSURE

A method is provided for acquiring incoming signals in a wireless network device. This method uses three different types of preamble: a normal preamble, a short preamble, and a long preamble. One of these preambles will be used as a default preamble, Then, depending upon signal parameters, the device can change from one preamble to another, trading off data transmission speed and acquisition time to achieve the maximum data transmission speed by using the minimum acquisition time. These signal parameters could be signal strength, the number of packet retransmissions the device must request, or any other metric that is required. And thresholds will vary with the quality of service.